

## **GPU SuperServer SYS-822GS-NBRT**

DP Intel 8U System with NVIDIA HGX B200 8-GPU supporting 32 DIMMs



## **Key Applications**

Scientific Research, Conversational AI, Business Intelligence & Analytics, Drug Discovery, Finance Services and Fraud Detection, AI/Deep Learning Training and Inference, Large Language Model (LLM) and Generative AI, High Performance Computing (HPC), Autonomous Vehicle Technologies,

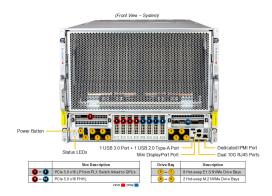
## **Key Features**

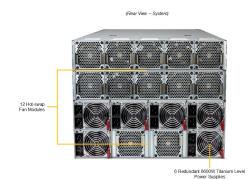
- Dual Intel® Xeon® 6700/6500 series processors with P-cores, up to 350W TDP;
- HGX B200 8-GPU SXM6 with NVSwitch, 1000W TDP per GPU, air cooled;
- 32 DIMM slots supporting up to 8TB of memory;
- 8 Hot-swap E1.S NVMe storage drives , 2 M.2 NVMe;
- Up to 8 PCle 5.0 x16 LP + 2 PCle 5.0 x16 FHHL;
- 1 USB 3.0 port, 1 USB 2.0 port, 1 Mini-DP port, 1 IPMI GbE LAN port, 2 10G NIC (X710):
- 6 redundant (3+3) 6600W Titanium level power supplies;
- 8U air-cooled Front I/O system;



Form Factor	8U Rackmount Enclosure: 449 x 356 x 950mm (17.6" x 13.8" x 37.4") Package: 1280 x 670 x 730mm (50.39" x 26.38" x 28.74")
Processor	Dual Socket E2 (LGA-4710) Intel® Xeon® 6700/6500 series processors with P-cores Up to 86C/172T; Up to 336MB Cache per CPU
GPU	Max GPU Count: 8 onboard GPUs Supported GPU: NVIDIA SXM: HGX B200 8-GPU (180GB) CPU-GPU Interconnect: PCIe 5.0 x16 CPU-to-GPU Interconnect GPU-GPU Interconnect: NVIDIA® NVLink® with NVSwitch™
System Memory	Slot Count: 32 DIMM slots Max Memory (1DPC): Up to 4TB 6400MT/s ECC DDR5 RDIMM Max Memory (2DPC): Up to 8TB 5200MT/s ECC DDR5 RDIMM
Drive Bays Configuration	Default: Total 8 bays • 8 front hot-swap E1.S NVMe drive bays M.2: 2 M.2 PCIe 5.0 x4 NVMe slots (M-key 2280/22110; RAID support via S3808N controller)
Expansion Slots	Default  • 8 PCIe 5.0 x16 LP slots  • 2 PCIe 5.0 x16 FHHL slots
On-Board Devices	Chipset: System on Chip Network Connectivity: 2 RJ45 10GbE with Intel® X710
Input / Output	LAN: 1 RJ45 1 GbE Dedicated BMC LAN port  USB: 1 USB 3.0 Type-A port(Front)  1 USB 2.0 Type-A port(Front)  Video: 1 Mini-DP port(Front)  TPM: 1 TPM header







System Cooling	Fans: 12 heavy duty fans with optimal fan speed control Air Shroud: 1 Air Shroud
Power Supply	6x 6600W Redundant (3 + 3) Titanium Level (96%) power supplies
System BIOS	BIOS Type: AMI 64MB UEFI
Management	SuperCloud Composer®; Supermicro Server Manager (SSM); Super Diagnostics Offline (SDO); Supermicro Thin-Agent Service (TAS); SuperServer Automation Assistant (SAA) New!
PC Health Monitoring	CPU: Monitors for CPU Cores, Chipset Voltages, Memory 8+4 Phase-switching voltage regulator  FAN: Fans with tachometer monitoring Status monitor for speed control Pulse Width Modulated (PWM) fan connectors  Temperature: Monitoring for CPU and chassis environment Thermal Control for fan connectors
Dimensions and Weight	Weight: Gross Weight: 341 lbs (155 kg)  Net Weight: 293 lbs (133 kg)  Available Color: Silver
Operating Environment	Operating Temperature: 10°C to 35°C (50°F to 95°F)  Non-operating Temperature: -40°C to 70°C (-40°F to 158°F)  Operating Relative Humidity: 8% to 90% (non-condensing)  Non-operating Relative Humidity: 5% to 95% (non-condensing)
Motherboard	Super X14DBG-LC+
Chassis	CSE-GP807TS-R000NP-B2